

DR. WEXLER. They do for ice conditions in the North Atlantic shipping lanes. They work very intensively in this area.

DR. COUNELL. One of the subjects, Mr. Macdonald, that the Academy's Committee on Oceanography is considering at the present time is the very serious problem of the very costly facilities that are badly needed in this country for oceanographic research, whether they be governmental or private, they do not exist today in the elaborateness and size that are needed.

DR. WEXLER. Speaking of oceanography brings up a matter of another ocean that you may want to have a brief discussion about; namely, the Arctic Ocean.

THE CHAIRMAN. Yes; I wanted to ask something about the Arctic. I realize full well we are going along here. I think most of us, not all, have to be down on the floor pretty soon and I did want to have some comment from you about it before we concluded.

DR. WEXLER. This will be very brief, Mr. Chairman. Perforce, our committee has spent most of its time in the three meetings we have had on the Antarctic because of the very long lead time to get men and equipment down there for the next season, but we have studied the Arctic and we are in the process of formulating our recommendations.

As you know, our program in the Arctic was a fairly substantial one even before the IGY, particularly when it came to land stations. We had our scientific stations in Alaska, Point Barrow, College, Alaska, outside of Fairbanks, and then in cooperation with the Canadians we have had a half dozen joint weather stations in the Canadian Archipelago as far north as 82 degrees latitude and, of course, Thule, Greenland, has been a scientific station in addition to a military base.

During the IGY, two additional stations have been set up on the ice in the Arctic Basin; namely, on Fletcher's Ice Island, which is ice very similar to the Ross Ice Shelf that projects above the surface some 30 or 40 feet.

MR. HALE. Where is that?

DR. WEXLER. I have a map here. Fletcher's Ice Island is this blue point here at approximately 80 degrees north and 115 degrees west. This has been occupied off and on since 1950. The latest occupation is during the IGY.

In addition, we had another station called United States Station Alpha on the ice pack itself at 82 north and 155 west. Both of these stations were set up for IGY and it is our recommendation, speaking for the Committee on Polar Research, that scientific programs be continued on those two stations in regard to meteorology, oceanography, the ice and whether it is increasing or decreasing, and also the ocean floor, the topography of the ocean and the submarine geology of that area.

In your committee report, on page 38, I believe you reproduced the map given out by the Soviets showing the landings they have made on the ice with their planes at several hundred points.

THE CHAIRMAN. I wish to call that to the attention of every member of this committee. If you have not seen it, I think it is one of the most interesting things that I have had brought to my attention.

DR. WEXLER. We have some reason to believe, Mr. Chairman, that there may be more points than are indicated on that map. This has been going on since 1951 so far as the Soviet endeavors are concerned.